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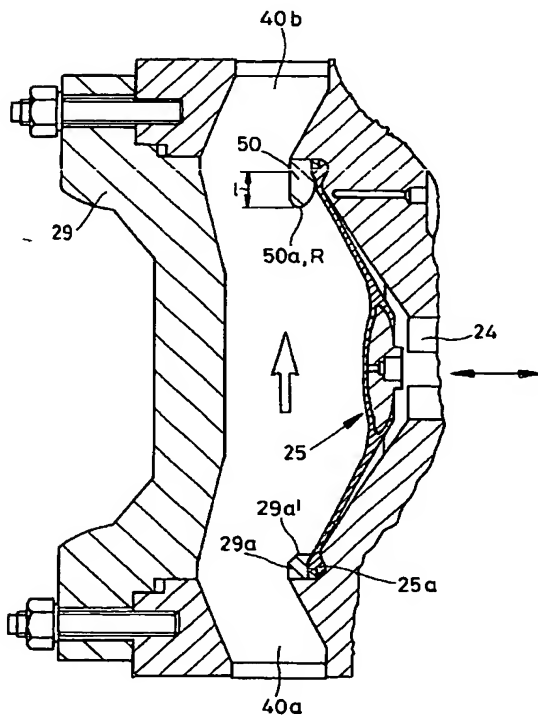
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[Continued on next page]

(54) Title: DIAPHRAGM PUMP



(57) Abstract: The invention relates to a diaphragm pump for pumping aggressive and/or abrasive media, such as slurries, comprising a diaphragm housing mounted in a substantially vertically disposed pipe system, which substantially vertically disposed pipe system comprises at least one inlet and at least one outlet positioned some distance above the inlet, as well as at least one substantially circular, flexible diaphragm, which diaphragm is movable within the diaphragm housing under the influence of a working liquid to be pressurised, in which the circular outer edge of the diaphragm is clamped down in the diaphragm housing by means of a circular clamping member. According to the invention, the diaphragm pump is characterized in that the circular clamping member is provided, on the circumferential edge thereof, with a flange that extends parallel to the plane formed by the clamping member. Since the circular clamping member is provided with a flange extending in the plane formed by the clamping member, disadvantageous deformation of the diaphragm during the delivery stroke will be prevented, because the deforming diaphragm will come to abut against the flange.

WO 2004/007961 A1

WO 2004/007961 A1

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## INTERNATIONAL SEARCH REPORT

PCT/NL 03/00497

A. CLASSIFICATION OF SUBJECT MATTER  
IPC 7 F04B43/067 F04B43/00

According to International Patent Classification (IPC) or to both national classification and IPC

## B. FIELDS SEARCHED

Minimum documentation searched (classification system followed by classification symbols)

IPC 7 F04B

Documentation searched other than minimum documentation to the extent that such documents are included in the fields searched

Electronic data base consulted during the international search (name of data base and, where practical, search terms used)

EPO-Internal, WPI Data, PAJ

## C. DOCUMENTS CONSIDERED TO BE RELEVANT

Category *	Citation of document, with indication, where appropriate, of the relevant passages	Relevant to claim No.
X	US 3 416 461 A (ROLLAND MCFARLAND) 17 December 1968 (1968-12-17)	1,7
Y	the whole document	2,3,5
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☒ Patent family members are listed in annex.

## \* Special categories of cited documents:

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Date of the actual completion of the international search

8 October 2003

Date of mailing of the international search report

15/10/2003

Name and mailing address of the ISA

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C.(Continuation) DOCUMENTS CONSIDERED TO BE RELEVANT		
Category *	Citation of document, with indication, where appropriate, of the relevant passages	Relevant to claim No.
X	FR 2 164 025 A (PEQUIGNOT MICHEL) 27 July 1973 (1973-07-27) the whole document figure 1	1
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